REMARKS/ARGUMENTS

Applicants amended the Specification and Drawings to correct minor errors.

The amended FIG. 3 of the drawings includes an amendment to block 310 to add "from" between image and other.

The Examiner rejected claims 1-11, 13-23, and 25-35 as obvious (35 U.S.C. §103) by Barrett (U.S. Patent No. 6,023,727) and Beyda (U.S. Patent No. 5,870,610). Applicants have amended certain claims and traverse the rejection with respect tot he amended and non-amended claims.

Claims 1, 13, and 25 concern updating code in a nodal system including at least three nodes, wherein each node includes a processing unit and a memory including code, and wherein the nodes communicate over a communication interface, and requires: updating code in a nodal system including at least three nodes, wherein each node includes a processing unit and a memory including code, and wherein the nodes communicate over a communication interface, comprising: transmitting, with at least one querying node, a request to at least two queried nodes in the nodal system for a level of the code at the nodes over the communication interface; receiving, with one node, responses from the queried nodes receiving the request indicating the levels of code at the queried nodes over the communication interface; and determining, with the node receiving the responses, whether at the at least two queried nodes have a higher code level.

Applicants amended claims 1, 13, and 25 to require: that the nodal system include at least three nodes that the request for the levels of the code are transmitted to at least two queried nodes; that the responses are received from the queried nodes; and that the determination of a higher code level is made for the at least two queried nodes.

The amended first limitation requires transmitting, with at least one querying node, a request to at least two queried nodes in the nodal system for a level of the code at the nodes over the communication interface. The Examiner cited col. 17, lines 1-2 of Barrett as teaching the pre-amended form of this limitation. (Office Action, pg. 3) Applicants traverse with respect to the amended limitation.

The cited col. 17 mentions that a microprocessor sends and receives communications and when a new program image is received over the network, the microprocessor downloads the new image. Nowhere does the cited col. 17 anywhere teach or suggest that one querying node

Page 12 of 20

transmits a request for a level of the code to at least two queried nodes (multiple queried nodes) in the nodal system. Instead, the cited col. 17 mentions that the microprocessor downloads a new image, not send a request to two nodes for their code levels as claimed.

The amended second limitation requires receiving, with one node, responses from the queried nodes receiving the request indicating the levels of code at the queried nodes over the communication interface. The Examiner cited col. 17, lines 2-4 of Barrett as teaching the pre-amended form of this limitation. (Office Action, pg. 3) Applicants traverse with respect to the amended limitation.

The cited col. 17 mentions that a microprocessor sends and receives communications and when a new program image is received over the network, the microprocessor downloads the new image. Nowhere does this cited col. 17 anywhere teach or suggest the claim requirement that one node receives responses form multiple queried nodes indicating the levels of code at the queried nodes. Instead, the cited col 17 mentions that a microprocessor receives a new image and confirms the image is compatible. There is no teaching, suggestion or mention in the cited col. 17 that information on code levels from multiple queried nodes is received as claimed.

The amended third limitation requires determining, with the node receiving the responses, whether at the at least two queried nodes have a higher code level. The Examiner cited col. 4, lines 54-65 of Beyda as teaching the pre-amended form of this limitation. (Office Action, pg. 3) Applicants traverse with respect to the amended limitation.

The cited col. 4 of Beyda mentions that a device locator identifies one of the devices, such as a device added since the last boot up of the system. If the first device 16 has been added since the last boot up, the device locator identifies the first device and then interrogates the device in order to determine its resource requirements. An autoconfiguration component passes the resource requirements to the configuration manager and an updated resource table is stored.

Nowhere does the cited Beyda anywhere teach or suggest determining whether at least two queried nodes have a higher code level. Instead, the cited col. 4 mentions that a device locator identifies devices added since the last boot up and determines its resource requirements. There is no mention in the cited Beyda of determining whether multiple other nodes have a higher code level as claimed.

Page 13 of 20

Accordingly, amended claims 1, 13, and 25 are patentable over the cited combination of Barrett and Beyda because these references, alone or in combination, do not teach or suggest all the claim requirements.

Claims 2-12, 14-23, and 26-35 are patentable over the cited art because they depend directly or indirectly from independent claims 1, 13, and 25 which are patentable over the cited art for the reasons discussed above. Moreover, the following dependent claims provide further grounds of patentability over the cited art.

Amended claims 2, 14, and 26 depend from claims 1, 13, and 25, respectively, and further require retrieving, with the node receiving the response, a copy of the code at the higher code level queried node if one of the at least two queried nodes has the determined higher code level and updating, with the node retrieving the copy of the code, the memory with the retrieved copy of the code at the higher code level from the queried node.

Applicants amended claims 2, 14, and 26 to clarify that a copy of the code at the higher code level queried node is retrieved if one of the at least two queried nodes has the determined higher code level,

The Examiner cited col. 3, lines 64-67 of Beyda as teaching the first limitation of the pre-amended form of these claims, which as amended requires retrieving, with the node receiving the response, a copy of the code at the higher code level queried node if one of the at least two queried nodes has the determined higher code level. (Office Action, pg. 4) Applicants traverse with respect to the amended claims.

The cited col. 3 of Beyda mentions that a PBX can automatically download the latest version of software from a manufacturer when a new board is installed. Nowhere does the cited col. 3 anywhere teach or suggest that a copy of the code is retrieved if one of at least two queried nodes has the higher code level. There is no mention in the cited Beyda of looking at two or more queried nodes to determine which has a higher code level, then retrieving that higher code level. Instead, the cited Beyda mentions downloading software when a new board is installed.

Accordingly, claims 2, 14, and 26 provide additional grounds of patentability over the cited art because the additional requirements of these claims are not taught or suggest5ed in the cited combination.

Amended claims 3, 15, and 27 depend from claims 1, 13, and 25, respectively, and further require that the node receiving the response from the queried nodes and determining whether the queried nodes have the higher code level comprises the querying node or a node that did not transmit the request to the queried node.

Applicants amended these claims to require that the response is from queried nodes and the determination of the higher code level is made with respect to queried nodes.

The Examiner cited col. 4, lines 54-65 of Beyda as teaching the pre-amended requirements of these claims. (Office Action, pg. 4) Applicants traverse with respect to the amended claims.

The cited col. 4 of Beyda mentions that a device locator identifies one of the devices, such as a device added since the last boot up of the system. If the first device 16 has been added since the last boot up, the device locator identifies the first device and then interrogates the first device in order to determine its resource requirements. An autoconfiguration component passes the resource requirements to the configuration manager and an updated resource table is stored.

Nowhere does the cited Beyda anywhere teach or suggest that the node determining which of multiple nodes have the higher code level includes the querying node that queried the multiple nodes or a node that did not transmit the request to the queried node. Nowhere does the cited Beyda anywhere teach or suggest that a node, whether initiating the query or not, determine whether one of multiple nodes has a higher code level. Instead, the cited Beyda mentions that one device determines resource requirements of an added device.

Accordingly, amended claims 3, 15, and 27 provide additional grounds of patentability over the cited art because the additional requirements of these claims are not taught or suggest5ed in the cited combination.

Claims 4, 16, and 28 depend from claims 1, 13, and 25, respectively, and further require broadcasting, with the queried node having the highest code level, the code to multiple nodes over the communication interface, wherein the nodes retrieve the copy of the code by reading the broadcast of the code on the communication interface.

The Examiner cited col. 1, line 62 to col. 2, line 3 of Barrett as teaching the additional requirements of these claims. (Office Action, pg. 4) Applicants traverse.

The cited cols. 1-2 of Barrett mentions that a network communication device communicating on a network includes a reprogrammable ROM storing a current program image and configuration information and a software module for reprogramming the reprogrammable ROM. A RAM stores a current program image for the reprogrammable ROM.

Although the cited cols. 1-2 discuss how a current program image is maintained for a programmable ROM, nowhere does the cited Barrett anywhere teach or suggest that a queried node having the highest code level broadcast the code to multiple nodes over the communication interface, wherein the nodes retrieve the copy of the code by reading the broadcast of the code on the communication interface. Nowhere do the cited cols. 1-2 anywhere suggest or mention the claim requirements of a broadcasting operation of the node having the highest code level and then other nodes retrieving the copy of the code at the highest level.

Accordingly, claims 4, 16, and 28 provide additional grounds of patentability over the cited art because the additional requirements of these claims are not taught or suggest5ed in the cited combination.

Claims 5, 17, and 29 depend from claims 1, 13, and 25, respectively, and further require determining whether one queried node has a higher code level is performed each time the nodal system is reset or the querying node is reset independently.

The Examiner cited the device locator at col. 4, lines 56-61 of Beyda as teaching the additional requirements of these claims. (Office Action, pg. 4) Applicants traverse.

The cited col. 4 of Beyda mentions that a device locator identifies one of the devices, such as a device added since the last boot up of the system. If the first device 16 has been added since the last boot up, the device locator identifies the first device and then interrogates the device in order to determine its resource requirements.

Although the cited Beyda mentions identifying devices added since the last boot up of the system, nowhere does the cited Beyda anywhere teach, suggest or mention determining whether a node has a higher code level each time the nodal system of at least three nodes is reset or the querying node is reset independently. Instead, the cited Beyda mentions that a device is interrogated when adding the device to determine its resource requirements.

Page 16 of 20

Accordingly, claims 5, 17, and 29 provide additional grounds of patentability over the cited art because the additional requirements of these claims are not taught or suggest5ed in the cited combination.

Amended claims 6, 18, and 30 depend from claims 1, 13, and 25, respectively, and further require that multiple querying nodes transmit the request for the code level to the at least two queried nodes, and wherein the queried nodes broadcasts information on the code level to the nodes.

Applicants amended these claims to the requests for the code level to at least two queried nodes and that the queried nodes broadcast information on their.code levels.

The Examiner cited col. 10, lines 5-21 of Barrett as teaching the additional requirements of the pre-amendment form of these claims (Office Action, pgs. 4-5) Applicants traverse with respect to the amend claims.

The cited col. 10 of Barrett mentions that communication protocol types may be broadcasted on the LAN. The NEB monitors network traffic to determine the protocol types in use and loads the protocol stack for the detected protocols.

Nowhere does the cited col. 10 anywhere teach or suggest that multiple querying nodes transmit the request for the code level to at least two queried nodes and the multiple queried nodes broadcast information on the code level. Instead, the cited col. 10 mentions monitoring network traffic to determine protocol types and provides no teaching or suggestion that multiple querying nodes transmit code level request to at least two other nodes and the other nodes broadcast information on the code level. The specific claimed broadcasting is not taught or suggested in the cited col. 10.

Accordingly, amended claims 6, 18, and 30 provide additional grounds of patentability over the cited art because the additional requirements of these claims are not taught or suggest5ed in the cited combination.

Amended claims 8, 20, and 32 depend from claims 1, 13, and 25, respectively, and further require that all nodes in the nodal system transmit the request to at least two queried nodes and determine whether the queried nodes have the higher code level.

These claims were amended to recite that all nodes transmits request to at least two queried nodes.

The Examiner cited col. 10, lines 5-21 of Barrett as teaching the additional requirements of the pre-amended form of the claims. (Office Action, pg. 5) Applicants traverse with respect to the amended claims.

The cited col. 10 mentions that communication protocol types may be broadcasted on the LAN. The NEB monitors network traffic to determine the protocol types in use and loads the protocol stack for the detected protocols.

Although the cited col. 10 mentions broadcasting, nowhere does the cited col. 10 anywhere teach or suggest that multiple nodes transmit requests for a code level to at least two queried nodes and determine whether the multiple queried nodes have the higher code level. These specific claimed operations are nowhere taught or suggested in the cited Barrett.

Accordingly, claims 8, 20, and 32 provide additional grounds of patentability over the cited art because the additional requirements of these claims are not taught or suggest5ed in the cited combination.

Claims 10, 22, and 34 depend from claims 1, 13, and 25, respectively, and further require a first node is capable of controlling an accessor in a storage library system to access storage cartridges and wherein a second node is capable of interfacing with a host system and communicating commands from the host system to the first node to execute.

The Examiner cited col. 16, lines 23-32 of Barrett as teaching the additional requirements of these claims. (Office Action, pg. 5) Applicants traverse.

The cited col. 16 mentions that a network board (NEB) can be reprogrammed by activating a program that scans the network to identify flash targets for all network devices connected to the network. Nowhere does the cited col. 16 anywhere teach or suggest or mention one node controlling an accessor in a storage library and another interfacing with a host system. There is no mention anywhere in the cited Barrett of a storage library, accessor or interface as claimed.

Accordingly, claims 10, 22, and 34 provide additional grounds of patentability over the cited art because the additional requirements of these claims are not taught or suggest5ed in the cited combination.

Amended claims 11, 23, and 35 depend from claims 1, 13, and 25 and further require that the at least one querying node executes a routine to transmit the requests to the at least two

Page 18 of 20

queried nodes, receive the response from the at least one queried node, and determine whether the at least one queried node has a higher code level than a code level indicated in a parameter in the memory, wherein the parameter is initially set to the code level of the querying node.

These claims were amended to require that the requests are transmitted to at least two queried nodes.

The Examiner cited col. 17, lines 1-4 of Barrett as teaching the claim requirement that at least one querying node executes a routine to transmit the requests to the at least two queried nodes. (Office Action, pg. 6) Applicants traverse.

The cited col. 17 mentions that a microprocessor sends and receives communications and when a new program image is received over the network, the microprocessor downloads the new image. Nowhere does this cited col. 17 anywhere teach or suggest the claim requirement that one node sends requests to at least two queried nodes for a code level as claimed.

The Examiner cited col. 4, lines 54-65 of Beyda as teaching the claim requirement of determining whether the at least one queried node has a higher code level than a code level indicated in a parameter in the memory, wherein the parameter is initially set to the code level of the querying node. (Office Action, pg. 6) Applicants traverse.

The cited col. 4 of Beyda mentions that a device locator identifies one of the devices, such as a device added since the last boot up of the system. If the first device has been added since the last boot up, the device locator identifies the first device and then interrogates the device in order to determine its resource requirements. An autoconfiguration component passes the resource requirements to the configuration manager and an updated resource table is stored.

Nowhere does the cited Beyda anywhere teach or suggest determining whether at least two queried nodes have a higher code level. Instead, the cited col. 4 mentions that a device locator identifies devices added since the last boot up and determines its resource requirements. There is no mention in the cited Beyda of determining whether multiple other nodes have a higher code level as claimed.

Accordingly, amended claims 11, 23, and 35 are patentable over the cited combination of Barrett and Beyda because these references, alone or in combination, do not teach or suggest all the claim requirements.

The Examiner rejected claims 12, 24, and 36 as obvious (35 U.S.C. §103) over Barrett in view of Beyda and Russell (U.S. Patent No. 5,623,604). Applicants traverse.

Claims 12, 24, and 36 are patentable over the cited art because they depend from claims 1, 13, and 25, respectively, which are patentable over the cited art for the reasons discussed above.

Conclusion

For all the above reasons, Applicant submits that the pending claims 1-36 are patentable over the art of record. Applicants have not added any claims. Nonetheless, should any additional fees be required, please charge Deposit Account No. 09-0449.

The attorney of record invites the Examiner to contact him at (310) 553-7977 if the Examiner believes such contact would advance the prosecution of the case.

Dated: September 24, 2004   By:
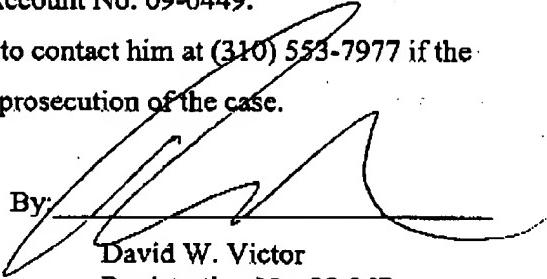
                                                     David W. Victor
                                                     Registration No. 39,867

Please direct all correspondences to:

David Victor
Konrad Raynes & Victor, LLP
315 South Beverly Drive, Ste. 210
Beverly Hills, CA 90212
Tel: 310-553-7977
Fax: 310-556-7984

Page 20 of 20